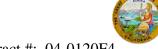
DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES Office of Structural Materials Quality Assurance and Source Inspection

Bay Area Branch 690 Walnut Ave.St. 150 Vallejo, CA 94592-1133 (707) 649-5453 (707) 649-5493



Contract #: 04-0120F4

Cty: SF/ALA Rte: 80 PM: 13.2/13.9

File #: 69.28

WELDING INSPECTION REPORT

Resident Engineer: Pursell, Gary **Report No:** WIR-005645 Address: 333 Burma Road **Date Inspected:** 24-Feb-2009

City: Oakland, CA 94607

OSM Arrival Time: 645 **Project Name:** SAS Superstructure **OSM Departure Time:** 1845 **Prime Contractor:** American Bridge/Fluor Enterprises, a JV

Contractor: Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China

CWI Name: Hu Wei Oing **CWI Present:** Yes No N/A **Inspected CWI report:** Yes **Rod Oven in Use:** Yes No No N/A N/A **Electrode to specification:** Yes No Weld Procedures Followed: Yes No N/A N/A **Qualified Welders:** Yes No **Verified Joint Fit-up:** Yes No N/A N/A Yes No N/A **Approved Drawings:** Yes No **Approved WPS:** Yes No N/A **Delayed / Cancelled:**

34-0006 **Bridge No: Component:** OBG

Summary of Items Observed:

On this day Caltrans OSM Quality Assurance (QA) Inspector Erik Prue was present during the times noted above for observations relative to the fabrication of the SAS Superstructure being performed by Zhenhua Port Machinery Company (ZPMC) at Changxing Island in Shanghai, China. QA Inspector observed and/or found the following:

Bay 2 segment 1AW: QA Inspector randomly observed ZPMC qualified welders ID #048389 repair welding side plate to bottom plate Seg 003-004 and #0377237 repair welding Seg 003-007. Welders were observed welding in the 4G (overhead) position utilizing Shielded Metal Arc Welding (SMAW) process. QA Inspector observed the ZPMC QC CWI Hu Wei Oing verifying welding parameters and pre-heat were in accordance with the Welding Procedure Specification (WPS). QA Inspector with QC Inspector observed parameters taken as follows: preheat temperature to be at 65°C and 60°C and measured the welding parameters to be 154 and 157 amps, 22 and 21 volts, a travel speeds of 98 and 90 mm/min. Welding parameters verified by QA Inspector appear to be in general compliance with the approved WPS-345-SMAW-4G (4F) to WRR B-W2527.

Bay 2 segment 1AE and 1AW: QA Inspector observed rib stiffeners RS95K and RS96K (lift 1AE) and rib stiffeners RS95C and RS96C (lift 1AW) complete joint penetration (CJP) butt splices tack welded to side plates without an approved drawing for the CJP welds. The rib stiffener CJP welds were added when the rib stiffeners were cut and removed from side plates to facilitate access for CJP welds on side plates. AWS D1.5 (02) paragraph 6.5.1 states "The Inspector shall make certain that the size, length, and location of all welds conform to the requirements of this code and to the detail drawings and that no unspecified welds have been added without approval. Representative picture of RS96C to side plate 403A shown below. Other rib stiffeners (3) are in the same condition. Please see incident report dated 25 February, 2009 for further details.

WELDING INSPECTION REPORT

(Continued Page 2 of 2)

Unless otherwise noted, all work observed on this date appears to be in general compliance with the applicable contract documents.

Summary of Conversations:

Conversations noted in items above.





Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang, 15000422372, who represents the Office of Structural Materials for your project.

Inspected By:	Prue,Erik	Quality Assurance Inspector
Reviewed By:	Carreon, Albert	QA Reviewer